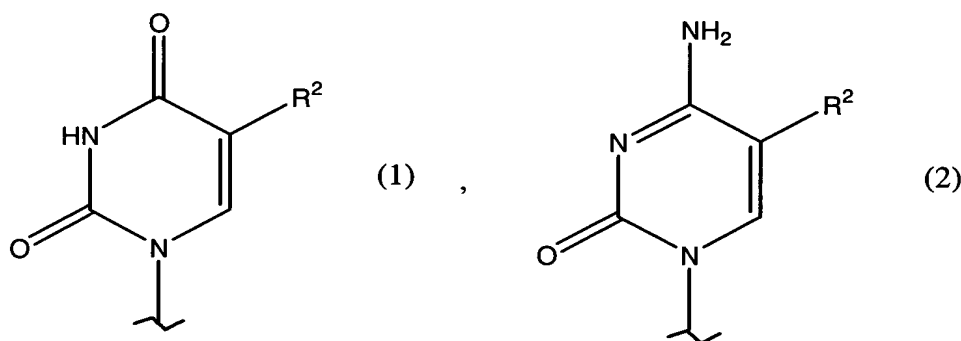


This listing of claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims:

1-127 (Canceled).

128 (Currently Amended). A primer for amplification or detection of a nucleic acid, the primer comprising an oligomer, a tautomer, solvate or salt thereof, the oligomer having at least one base of formula (1) or (2):



wherein, at least one base is of formula (1), where R^2 is selected from the group consisting of propynyl, ~~propenyl~~, 3-buten-1-ynyl, 3-methyl-1-butynyl, 3,3-dimethyl-1-butynyl, phenyl, m-pyridinyl, p-pyridinyl and o-pyridinyl, or

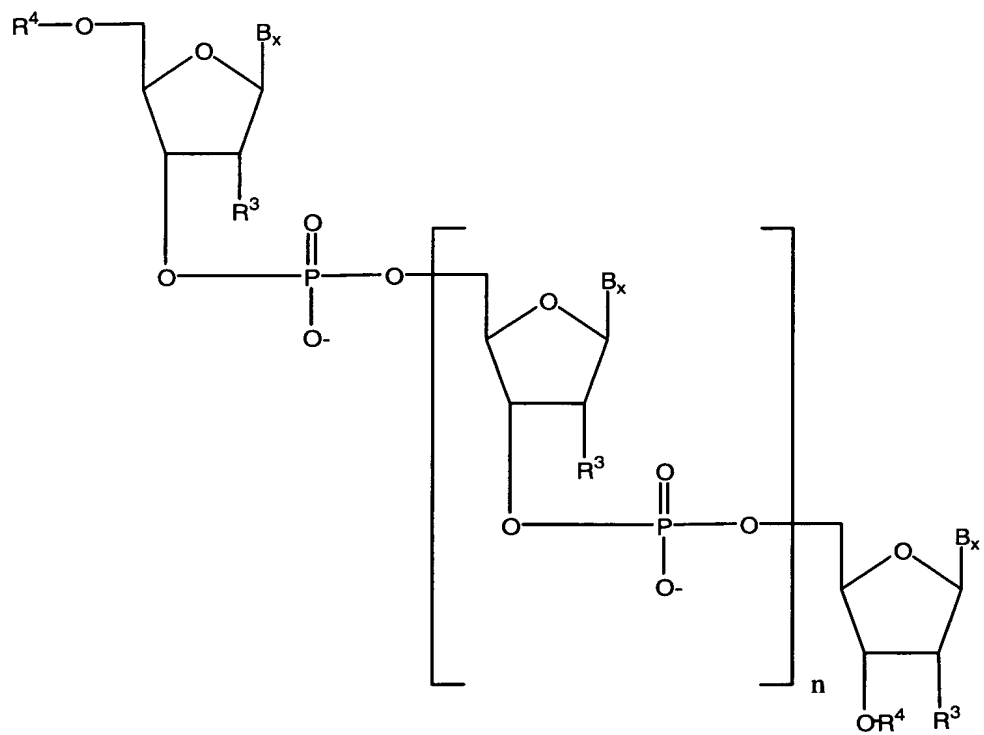
at least one base is of formula (2), where R^2 is selected from the group consisting of propynyl, ~~propenyl~~, 3-buten-1-ynyl, 3-methyl-1-butynyl, 3,3-dimethyl-1-butynyl, phenyl, m-pyridinyl, p-pyridinyl and o-pyridinyl.

129 (Previously Presented). The primer of claim 128, wherein R^2 is propynyl or 3-methyl-1-butynyl.

130 (Previously Presented). The primer of claim 128, wherein R^2 is a propynyl.

131 (Previously Presented). The primer of claim 128, wherein R^2 is 3-methyl-1-butynyl.

132 (Previously Presented). The primer of claim 128, wherein the oligomer has the formula:



wherein

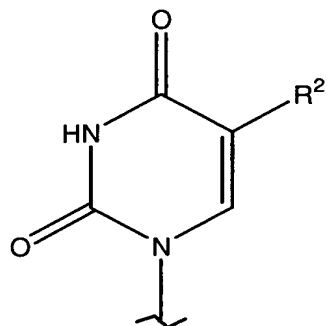
each R³ is independently selected from the group consisting of H, OH, F, OCH₃, OC₂H₅, OC₃H₇, SCH₃, SC₂H₅, SC₃H₇, OC₃H₅, and SC₃H₅;

each R⁴ is independently selected from the group consisting of H and a blocking group;

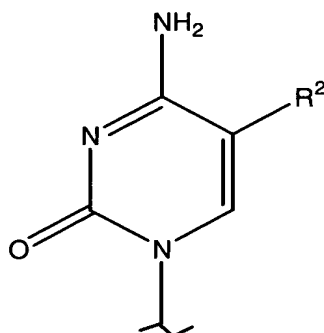
n is an integer of from 4 to 30; and

B_x is a purine or pyrimidine base, at least one of said B_x being (1) or (2).

133 (Currently Amended). A probe for amplification or detection of a nucleic acid, the probe comprising an oligomer, the oligomer having at least one base of formula (1) or (2):



(1) ,



(2)

wherein, at least one base is of formula (1), where R^2 is selected from the group consisting of propynyl, propenyl, 3-buten-1-ynyl, 3-methyl-1-butynyl, 3,3-dimethyl-1-butynyl, phenyl, m-pyridinyl, p-pyridinyl and o-pyridinyl, or

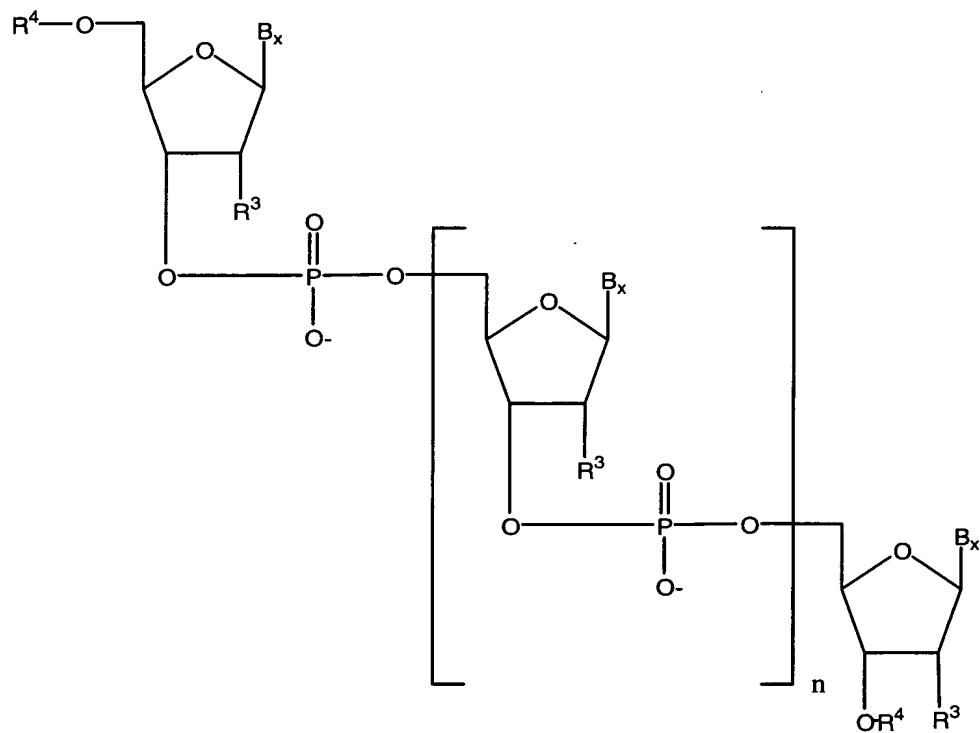
at least one base is of formula (2), where R^2 is selected from the group consisting of propynyl, propenyl, 3-buten-1-ynyl, 3-methyl-1-butynyl, 3,3-dimethyl-1-butynyl, phenyl, m-pyridinyl, p-pyridinyl and o-pyridinyl.

134 (Currently Amended). The ~~primer~~ probe of claim 133, wherein R^2 is propynyl or 3-methyl-1-butynyl.

135 (Currently Amended). The ~~primer~~ probe of claim 133, wherein R^2 is a propynyl.

136 (Currently Amended). The ~~primer~~ probe of claim 133, wherein R^2 is 3-methyl-1-butynyl.

137 (Currently Amended). The ~~primer~~ probe of claim 133, wherein the oligomer has the formula:



wherein

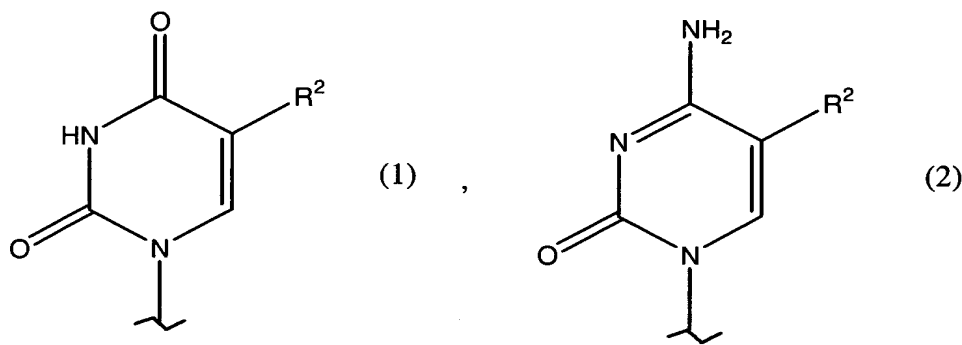
each R^3 is independently selected from the group consisting of H, OH, F, OCH_3 , OC_2H_5 , OC_3H_7 , SCH_3 , SC_2H_5 , SC_3H_7 , OC_3H_5 , and SC_3H_5 ;

each R^4 is independently selected from the group consisting of H and a blocking group;

n is an integer of from 4 to 30; and

B_x is a purine or pyrimidine base, at least one of said B_x being (1) or (2).

138 (Previously Presented). A pair of primers for amplification or detection of a nucleic acid, at least one of said primers comprising an oligomer, said oligomer having at least one base of formula (1) or (2):



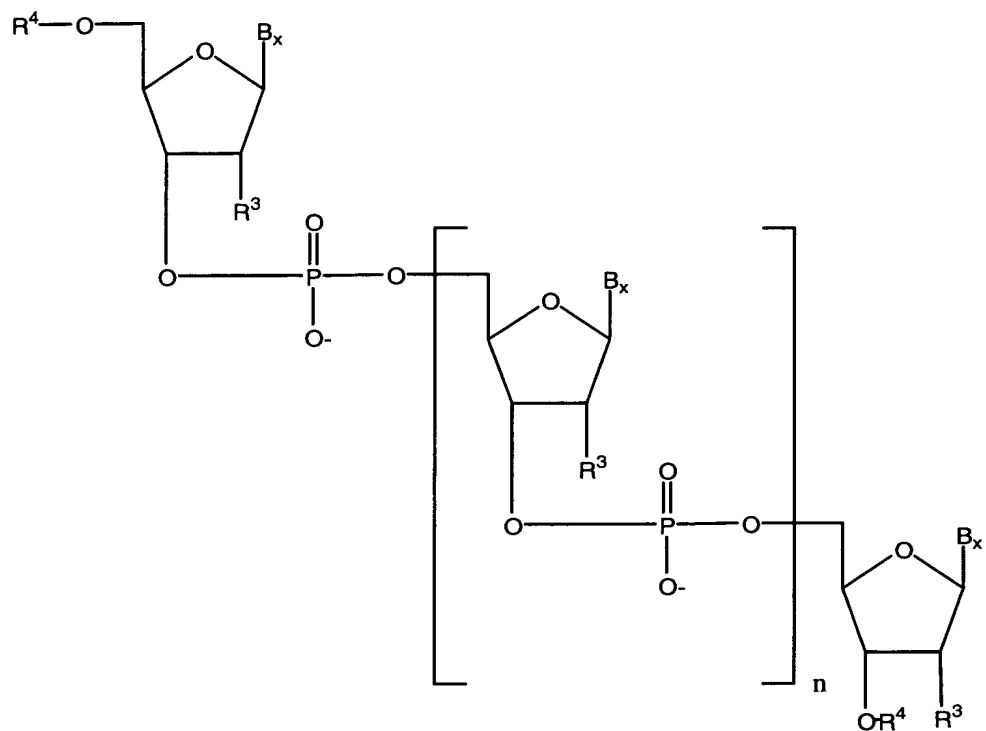
wherein R² is selected from the group consisting of propynyl, propenyl, 3-buten-1-ynyl, 3-methyl-1-butyryl, 3,3-dimethyl-1-butyryl, phenyl, m-pyridinyl, p-pyridinyl and o-pyridinyl.

139 (Currently Amended). The ~~primer~~ pair of primers of claim 138, wherein R² is propynyl or 3-methyl-1-butyryl.

140 (Currently Amended). The ~~primer~~ pair of primers of claim 138, wherein R² is a propynyl.

141 (Currently Amended). The ~~primer~~ pair of primers of claim 138, wherein R² is 3-methyl-1-butyryl.

142 (Currently Amended). The ~~primer~~ pair of primers of claim 138, wherein the oligomer has the formula:



wherein

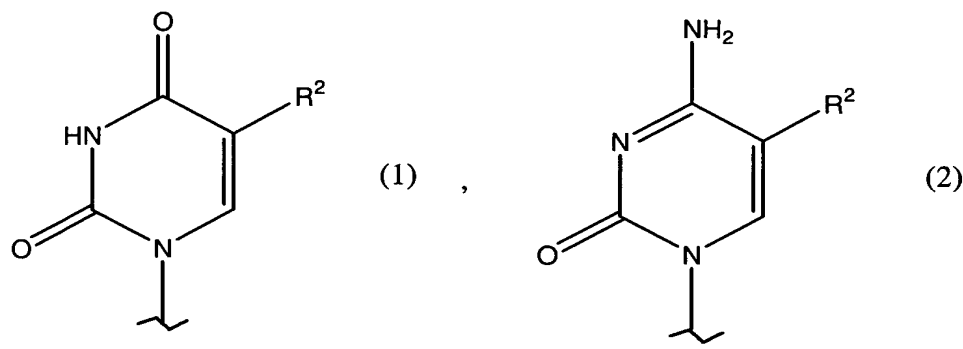
each R^3 is independently selected from the group consisting of H, OH, F, OCH_3 , OC_2H_5 , OC_3H_7 , SCH_3 , SC_2H_5 , SC_3H_7 , OC_3H_5 , and SC_3H_5 ;

each R^4 is independently selected from the group consisting of H and a blocking group;

n is an integer of from 4 to 30; and

B_x is a purine or pyrimidine base, at least one of said B_x being (1) or (2).

143 (Previously Presented). A pair of primers for amplification or detection of nucleic acid, each of said pair of primers comprising an oligomer, each said oligomer independently having at least one base of formula (1) or (2):



wherein R² is selected from the group consisting of propynyl, propenyl, 3-buten-1-ynyl, 3-methyl-1-butynyl, 3,3-dimethyl-1-butynyl, phenyl, m-pyridinyl, p-pyridinyl and o-pyridinyl.

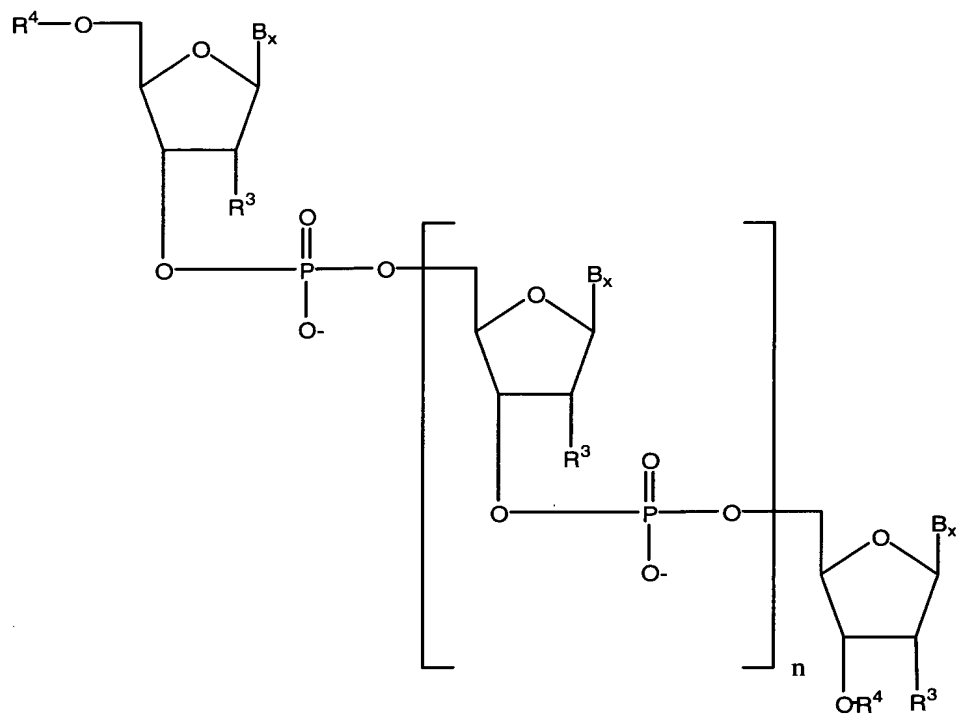
144 (Previously Presented). The pair of primers of claim 143, wherein R² is propynyl or 3-methyl-1-butynyl.

145 (Previously Presented). The pair of primers of claim 143, wherein R² is a propynyl.

146 (Previously Presented). The pair of primers of claim 143, wherein R² is 3-methyl-1-butynyl.

147 (Previously Presented). The pair of primers of claim 143, wherein the oligomer has the formula:

PATENT



each R³ is independently selected from the group consisting of H, OH, F, OCH₃, OC₂H₅, OC₃H₇, SCH₃, SC₂H₅, SC₃H₇, OC₃H₅, and SC₃H₅;

n is an integer of from 4 to 30; and

B_x is a purine or pyrimidine base, at least one of said B_x being (1) or (2).